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## Higher education system in the Kyrgyz Republic at the present stage

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### Abstract

**Relevance.** The relevance of this study is conditioned by the fact that in the conditions of global changes it is necessary to train a new generation of citizens able to adequately respond to the challenges of society.

**Purpose.** The purpose of this study was to investigate the reforms carried out in higher education in the Kyrgyz Republic to determine compliance with international standards.

**Methodology.** The research methodology is based on a combination of general scientific (analysis, synthesis, generalisation) and special scientific (historical-logical, retrospective, system-structural analysis, statistical) methods.

**Results.** The findings of this study describe that Kyrgyz Republic has gradually implemented the European initiative on harmonisation of the education system for interaction between European universities, as well as reforming the higher education system. It was noted that in the Kyrgyz Republic, for the implementation of tasks to meet international standards of education, a transition was carried out to a credit-module system following the Bologna Convention; developed social partnerships and active involvement of employers in the educational process; an effective policy was carried out on human resources management. Kyrgyz Republic's education system has undergone two stages during the last 15 years, namely the liberal stage and the stage of comparative stability. In the Kyrgyz Republic there is now an inherent desire to rationalise the management of education, the focus on consolidation and use of European practices has become a determining factor. In recent years, there has been a significant increase in the number of exchange programmes involving students and teachers from Kyrgyz Republic, for instance: the presidential programme "El Umutu", private programmes from international organisations (Erasmus Mundus, Tempus).

**Conclusions.** The practical significance of this study is that the main provisions, ideas, and conclusions can serve scientists, teachers, and researchers for further scientific searches on reforming higher education in Kyrgyz Republic.

**Keywords:** European practices; Bologna Process; universities; exchange programmes; international cooperation.

### Introduction

An important condition for the development of modern society is a well-functioning education system, which becomes the basis for ensuring a high rate of scientific, technical, economic, social, cultural, and spiritual progress. The system of higher education is a strategic

resource for the development of society, improving the welfare of the people, national security and interests, strengthening the authority and competitiveness of the state and should be aimed at developing and building a strong democratic state. For instance, in their research paper, R.J.S. Macpherson et al. [1] note that the use of

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modern science and technology is also prioritised because it implies traditional values, culture, and synthesis of old and new values to ensure sustainable economic growth of the country. However, the work is more focused on general issues of higher education in a global context.

It is worth noting the globality of higher education strategies in Kyrgyz Republic, the extremely wide range of objects and, consequently, a wide range of tasks set, which regulate state support in the sphere of education. The basis for the implementation of the process of connected educational systems is the integration of elements, which is the “point of growth”, designed and implemented innovations. To prepare the young generation for life in such a dynamic world, it is necessary to equip them with the theoretical and practical knowledge and skills to continue acquiring new knowledge independently in their lifelong learning. For effective training of future specialists, a qualitative level of education regarding the laws of upbringing and development of personality, social relations, trends in the development of professional education, basics of pedagogy and psychology should be applied. A modern professional must be a model of a new type of worldview and have proper professional and pedagogical training to successfully form this worldview in people. First of all, it should be a highly qualified and visionary professional with a high level of moral and spiritual development and educational technology.

The development of Kyrgyz Republic’s economy and its social sphere requires an increase in the number of specialists. Their meanings and functionalities are changing, criteria in relation to professional competence and culture are becoming more complex, which also affects the educational system [2]. Z. Isakova [3] considers the specifics of the implementation of the Bologna Declaration in the educational sphere of the Kyrgyz Republic, but the author focuses more on the multilevel structure of education, which does not allow fully exploring the changes adopted in the Kyrgyz Republic regarding higher education.

The study by V. Deichman et al. [4] is important, where considerable work is being done to assess the quality of education, which is a key element of management in educational systems. The authors note that quality assessment is becoming one of the main tools for making managerial and pedagogical decisions. The paper presents the assessment system as a combination of policies, institutions, practices, and instruments aimed at generating and utilising data on the quality of education. In addition, the authors point out that effective assessment systems provide quality information that shows the needs of all stakeholders to improve the level of education. However, the authors focus more on preschool and secondary education and do not study higher education as much. Therefore, the specific features of the processes of optimisation of the national education system require in-depth analysis to clarify the holistic understanding of theoretical and practical aspects of the development of the national education system.

The paper by Z. Van and R. Wang [5] became relevant for this study, as it investigates the system of teacher education in Kyrgyz Republic and China. Their study revealed that the dominant factor in the performance of global goals for the country is the education system, the

main participants of which are teachers with the appropriate high level of professional and pedagogical qualifications. Hence, teacher education acts as the foundation of the entire education system. Reforms of the education system in Kyrgyz Republic over the last decade have been aimed at integration into the globalisation space to bring it closer to international educational standards. Thorough work has been carried out to update standards for all specialities, and variability and diversity of educational content has been achieved. However, the article focuses on the reforms in teacher education, which does not allow evaluating the entire process of change in the higher education system.

Thus, the subject under study is relevant, as it has not been fully considered by Kyrgyz researchers. The purpose of this study was to investigate and characterise the changes made in higher education in the Kyrgyz Republic in modern realities to determine compliance with international standards.

## **Materials and Methods**

The basis of methodological approach was a qualitative combination of interrelated and complementary general scientific (analysis, synthesis, generalisation) and specific scientific (historical-logical, retrospective, system-structural, statistical) methods. General scientific methods have become the fundamental basis for substantiating the analysed theoretical information about the regularities of higher education in the Kyrgyz Republic. The use of analysis helped to investigate issues comprehensively related to education in Kyrgyz Republic, to extract the necessary elements of information that affect higher education in Kyrgyz Republic at the present stage. Along with scientific developments, the legislation of Kyrgyz Republic was considered, namely aspects related to the educational process of higher education.

Using synthesis, it was possible to combine information concerning various issues of the higher education system in Kyrgyz Republic, its quality and educational programmes into a single logical structure. Based on the results of the synthesis, the data on internationalisation in higher education in Kyrgyz Republic were formulated, based on which it is carried out and further ways of development. Applying the method of generalisation to the obtained information, the main results concerning modern higher education in the Kyrgyz Republic were formulated. The method of generalisation helped to establish trends in the development of higher education in Kyrgyz Republic at the beginning of the 21st century in the context of the Bologna system, adopted at the legislative level for the integration of European standards in the educational process. Special scientific methods made it possible to turn to additional tools to find, explore information and form a final understanding of the subject under study. The use of historical and logical analysis made it possible to study and structure the information that relates to the issues of improving higher education in the Kyrgyz Republic through the introduction of European practices as one of the countries of the post-Soviet space. The study engaged the legislative and regulatory frameworks to provide a logically coherent analysis of the changes in higher education in a historical context.

Retrospective analysis helped to find out the changes in the social, cultural, and legal status of higher education institutions of Kyrgyz Republic, assigning them special privileges and powers, as well as to identify opportunities for further creative self-realisation of subjects of the educational process in the form of special scholarships, participation in international scientific programmes and exchange programmes for students and teachers. The retrospective analysis gave insight into the correctness of the chosen direction in the policy of improving the system of modern higher education in the Kyrgyz Republic. By using system-structural analysis it was possible to establish interrelationships between the elements of the higher education system in Kyrgyz Republic as a holistic, socio-cultural, economic, and educational phenomenon. The statistical method was used to process the numerical indicators of the number of students entering higher education institutions taken over a six-year period and to clarify the relationship between their number and the changes made by the state in the higher education system of Kyrgyz Republic.

The theoretical framework of this study included the following regulatory framework: the Constitution of the Kyrgyz Republic, Decree of the Government of the Kyrgyz Republic No. 201 “On Strategic Directions for the Development of the Education System in the Kyrgyz Republic” [6]; Decree of the Government of the Kyrgyz Republic dated No. 496 “On the Establishment of a Two-Level Structure of Higher Professional Education in the Kyrgyz Republic” [7]; Decree of the President of the Kyrgyz Republic No. 146 “On the Establishment of the International Scholarship of the President of the Kyrgyz Republic “El Umutu” [8]; Concept for the development of education in the Kyrgyz Republic for 2021-2030 [9]; Education development programme in the Kyrgyz Republic for 2021-2040 [10]; theoretical and methodological works, accordingly to which the education system is studied by a number of Kyrgyz and, mainly, foreign researchers, aimed at identifying problematic issues related to the improvement of theoretical and practical aspects of the development of the state educational system [11]; information and analytical materials of international and national institutions.

## Results

The transformation of the higher education system to the realities of the modern world appears to be an urgent task for Kyrgyz Republic. Therefore, to establish a unified cycle in the structure of higher education in accordance with the Decree of the Government of the Kyrgyz Republic dated No. 496 “On the Establishment of a Two-Level Structure of Higher Professional Education in the Kyrgyz Republic” [7] established a two-level system of higher education (bachelor’s and master’s degrees). Furthermore, the following initiatives have been adopted: Education development programme in the Kyrgyz Republic for 2021-2040 [10], Concept for the development of education in the Kyrgyz Republic for 2021-2030 [9]. The documents are based on both global goals and economic-social priorities of the state’s development. The concept is characterised by a shift in the priorities of the continuing education system and an emphasis on basic education, which provides a solid foundation for lifelong learning [7].

The activity of the higher education system is regulated by the Constitution of the Kyrgyz Republic, Decree of the President of the Kyrgyz Republic No. 243 “On Measures to Increase the Potential and Competitiveness of Educational Organisations of Higher Professional Education of the Kyrgyz Republic” [12], Decree of the President of the Kyrgyz Republic No. 146 “On the Establishment of the International Scholarship of the President of the Kyrgyz Republic “El Umutu” [7]. This system is also regulated by basic concepts about the educational body of higher professional education (higher education institution), regulatory documents of the Ministry of Education, Science and Youth Policy of the Kyrgyz Republic, and charters of higher education institutions. The leading role of higher education in improving the economy of the Republic requires deepening the reform of the higher education system and improving its quality in the long term, with a focus on creating an economy based on scientific knowledge [13]. In Kyrgyz Republic, the higher education system is becoming part of business, part of the market economy and is turning into a productive sphere. The key features of the reformed system are: emphasis on new products (creative individuals), educational standards; development of the market of educational services; transition to financing not the object, but the subject of the educational process; mechanisms to counteract corruption.

The establishment of a market economy is also evident in the higher education system, where the process of diversification of educational institutions is significant, but it is purely quantitative in nature, to the detriment of the quality of professional training. Apart from state universities, there are also private universities with foreign participation, which largely copy each other’s activities and train the same specialists without considering the demands of the current market supply in the country, which leads to an increase in the number of unemployed citizens with higher education. Most of these universities do not meet the performance standards defined by the state. The efficiency of higher education should be improved by increasing the differentiation of the education system and competition between HEIs, improving the quality of education, and addressing the problems of organisational and financial provision of higher education [14].

The accession of the Kyrgyz Republic in 2011 to the European initiative on harmonisation of education systems in the world, which was launched in 1999 by the Bologna Declaration, gave an impetus to cooperation between European universities, as well as in the field of education system reform. To realise these objectives, Kyrgyz Republic has introduced a credit system in higher education institutions following the Bologna Convention, thus demonstrating its readiness to enter the global educational process and guaranteeing the competitiveness of its graduates. Since it is well known that the Bologna Convention mainly implies a high degree of personal socialisation and conditions of social adaptation to market relations. The credit system lays the foundation for training professionals following global educational standards. It stimulates interest to knowledge and independent work of students in mastering a certain field of knowledge, forms opportunities for building individual trajectories of education. The active application of credit system

technologies in higher education institutions of Kyrgyz Republic is definitely a recognition of the possibility of studying abroad and the growth of student mobility. The technology of credit system of education has been in the experimental stage since 2005, when it began to be applied in several universities in Kyrgyz Republic. The introduction of experimental credit-based learning technologies has allowed HEIs in Kyrgyz Republic to identify specific tools and methods to guide the educational process to maximise its productivity [15].

The higher education system in Kyrgyz Republic consists of the following stages at the present stage, namely:

- basic higher education (bachelor’s degree);
- specialised or scientific-pedagogical higher education (master’s degree);
- Doctor of Philosophy (PhD).

The implementation of the three-level structure of the higher education system was aimed at aligning it with the international educational space, ensuring the expansion of the scope of the curriculum, as well as increasing its mobility and flexibility following the demands of market

economy development. The implementation of this model of education has proven its feasibility and practicality, but at the same time it requires further transformation in the future. The principal areas of development of the three-level model of higher education in Kyrgyz Republic are narrowing the scope of narrow specialisations and merging them into more extensive academic disciplines, strengthening the research orientation of education, developing interaction with enterprises, and ensuring demand for graduates in the labour market. Over the past 20 years, education in Kyrgyz Republic has gone through several stages: a liberal stage that led to the destruction of the previous system, and a stage of comparative stability with balanced acceptance and increasingly tough administrative decisions. At present, increased interest in improving educational management, focus on integration and use of Western experience has become a determining factor in the modernisation process. Therewith, the mechanical transfer of educational standards and models inevitably has a negative impact [16].

Having analysed the statistical data on the number of students in the three-tier structure system, we can present them in a table for clarity (Table 1).

**Table 1.** Quantitative indicator of students in Kyrgyz Republic by year

Academic year	Universities	Total number of students	Full-time department	Off-campus learning
2017-2018	52	214410	122680	91730
2018-2019	51	199505	119338	80167
2019-2020	51	175602	107552	68050
2020-2021	50	162350	110160	52190
2021-2022	49	159641	107336	52305

Source: compiled by the authors of this study.

The state policy in the field of higher education is aimed at achieving high quality of educational programmes. Therewith, the state requirements to the material and technical equipment of the educational process, the quality of teaching staff, and the application of modern teaching technologies are constantly increasing [17-20]. Notably, the following tasks in the field of higher education were achieved in 2020:

- conditions for continuing education have been created;
- social partnerships and active involvement of employers in the educational process are developed;
- there was a transition to a credit-modular system of education, which provides flexibility and mobility of students, and allows students to work (following the provisions of the Bologna and Lisbon Agreements);
- an effective policy on human resource management – launching a monitoring and evaluation system to improve the higher education system has been implemented.

According to the Decree of the President of the Kyrgyz Republic No. 243 “On Measures to Increase the Potential and Competitiveness of Educational Organisations of Higher Professional Education of the Kyrgyz Republic” [12], several universities were granted the status of National Universities. This decision, which affects five of Kyrgyz Republic’s largest universities, aims to raise the standards of higher education in Kyrgyz Republic in certain areas to international levels. The document is designed to consolidate financial, material, and intellectual

capabilities to enhance the capacity and ability of public higher education institutions of the Kyrgyz Republic to compete in the global arena.

According to the Decree, the following state higher education institutions of the Kyrgyz Republic have special status, ensuring their broad organisational, financial, and academic autonomy: Konstantin Skryabin Agrarian University (Konstantin Skryabin atyndagy Kyrgyz Uluttuk Agrardyk Universiti), Osh State University (Osh Mamlkettik Universiti), Zhusup Balasagyn University (Zhusup Balasagyn atyndagy Kyrgyz Uluttuk Universiti), Iskhak Razzakov Technical University (Iskhak Razakov atyndagy Kyrgyz Mamlkettik Technological University), Isa Akhunbaev Medical Academy (Isa Akhunbaev atyndagy Kyrgyz Mamlkettik Medical Academy). These public HEIs are entitled to: open bank accounts in private banks with state participation for the use of extra-budgetary funds; individually appoint vice-rectors responsible for academic work; independently assign the name and status of structural units of the HEI; regulate the procedure and organisation of their activities; requirements for their management and staff; autonomously generate income in the form of funds for educational, consulting, research, publishing and distribution activities; to receive funds from the state treasury system.

Among the specific features of the multilevel system of university training it is worth noting a rather wide coverage of students studying at the university, a high degree of unification of curricula by specialities and areas of higher professional education, a combination of extensive basic

bachelor's degree training with subsequent profile orientation to selected master's programmes. A multilevel system of continuing education means the presence of several levels of basic and professional education: the more levels in the system, supported by relevant state documents, the more opportunities open for the student to choose a convenient type of education and, if necessary, to change the chosen educational trajectory with relatively little loss [3; 21; 22]. The development of internationalisation in Kyrgyz Republic is carried out through established branches of foreign universities based on the leading universities of Kyrgyz Republic – KRSU Bishkek. Dual universities with foreign institutions – Ala-Too International Turkish University, Kyrgyz-Turkish Manas University, Kyrgyz-German Institute at KSUSTA – have been established [6].

In recent years, there has been a substantial increase in the number of exchange programmes involving students and teachers from Kyrgyz Republic [23]. Such exchange programmes are carried out within the framework of existing bilateral agreements between universities and participants of international programmes (Tempus, Erasmus Mundus, Irex, Usis). Although the number of Kyrgyz students travelling abroad has increased considerably, the number of foreign students coming to Kyrgyz Republic to study is still low [24-26]. The potential for internationalisation will increase considerably in the future. Studying abroad includes key aspects such as:

- international exchanges of participants of the educational process;
- international scholarships from governments of developed countries and international organisations;
- El Umutu (Hope of the People) international scholarships;
- private programmes.

In Kyrgyz Republic, the El Umutu programme has a special place, providing the most talented and capable young people with the opportunity to study at the best universities in the world. In May 2022, the Decree of the President of the Kyrgyz Republic No. 146 “On the Establishment of the International Scholarship of the President of the Kyrgyz Republic “El Umutu” was signed by the President of the Kyrgyz Republic Sadyr Zhaparov [7]. With the development of market relations, the state has chosen a development path that aims to build a strong and adaptable economy to changing conditions. Training of highly qualified specialists is one of the main factors in increasing the level of competitiveness of the country. The establishment of “Presidential Scholarships” will serve as a mechanism to provide gifted students with the opportunity to study at leading universities in promising fields that are essential for the Kyrgyz economy. The launch of the “El Umutu” International Scholarship of the President of Kyrgyz Republic gave students the opportunity to investigate at leading foreign universities internationally ranked in the “QS World University Rankings” and “Times Higher Education World Rankings” [18]. The scholarships will be used for master's and doctoral programmes in technology, engineering, economics, and socio-humanities. El Umutu scholarships are allocated annually from the Fund of the President of the Kyrgyz Republic.

The best students can receive the El Umutu scholarship once a year through a national committee, who have passed a competitive selection process. Notably, 50 “El Umutu” scholarships are awarded annually, of which:

- 20 Master's scholarships in technical and engineering fields;
- 10 Master's scholarships in economics;
- 10 Master's scholarships in social and humanitarian areas;
- for Doctor of Philosophy (PhD) programmes – 10 fellowships.

It should also be noted that there is interaction at the state level within the framework of international programmes and international organisations: European Union, UNESCO, UNDP, Peace Corps, USAID, Soros-Kyrgyz Republic Foundation, International Council for Scientific Research (Irex), German Academic Exchange Service (DAAD). These initiatives have considerably increased mobility opportunities for students in Kyrgyz Republic.

In summary, the Kyrgyz Republic follows the European vector of development and has certain successes in this respect. Since 2011, after the signing of the Bologna Declaration, the Kyrgyz government has started to implement initiatives to meet the global challenges in education. The higher education system is increasingly modernised and more in line with the European system, and the requirements for professors and university facilities are increasing. Increasingly more exchange and cooperation programmes for students and teachers are being launched.

## Discussion

The issue of integration into the world educational sphere is one of the integral elements of strengthening and expanding cooperation of Kyrgyz Republic in the world arena. This requires the training of specialists in the best foreign standards and technologies of education to obtain such knowledge that will solve modern problems of the country and will be in line with the state interests and goals for the development of higher education institutions. Therefore, the dynamism of modern socio-economic development requires continuous improvement of the education system.

In this regard, it is absolutely not accidental that in the second half of the 20th century the problem of reforming the education system became acute in all countries of the world [27]. According to the authors T. Sobhi and C. Charlène [19], the reason for this phenomenon was a reassessment of the values of world civilisation, in the process of which society has realised the need to educate cultural citizens with a global mind-set, capable of taking an active part in social development, transforming their reality and its environment. Analysing the educational strategy of Kyrgyz Republic and the ongoing reforms of higher education for the transition to international models of accreditation of higher education institutions, the creation of a new system of education quality assessment and new types of organisation of the educational process, one can note that modern higher education is based on the construction of a model of achieving life success of an individual, the relative autonomy of higher education institutions in the construction of educational activities and

the refusal of the obligations of higher education institutions in the employment of their graduates [20; 28].

Drawing a parallel with the study by D. Shamatov et al. [21], one can agree that the functioning of the higher education system in Kyrgyz Republic contradicts the quality of life of the majority of university employees, which not only violates the principles of social justice, but also leads to a decline in the role of higher education as a social institution, as a benchmark for the education of the new generation. The authors cite information that Kyrgyz Republic has a relatively low standard of living for teachers, which, admittedly, affects students as well. However, in recent years there has been a recalculation of teachers' salaries and their social condition has improved. The authors do not point out that new tasks do not always coincide with previous ones, and the violation of the consistency of educational policy undermines the stability of education and prevents in-depth analysis and reflection on the achievements and miscalculations of reforms. Therefore, the state policy should be the continuous development of education, which will undoubtedly ensure Kyrgyz Republic's entry into the world knowledge society.

When conducting this study, the authors did not consider the number of foreign students in higher education institutions in Kyrgyz Republic, as they focused more on the reforms implemented. However, as B. Borkoev and A. Alimbekov [18] note, the number of foreigners from Central Asia studying in the Kyrgyz Republic totals 40% of all students, which is a large indicator with a negative trend. It turns out that Kyrgyz students do not enter higher educational institutions that much. The authors also add that the level of knowledge of higher education institutions in Kyrgyz Republic makes one hesitate in doubts due to many irregularities.

Relevant to the study will be the paper by E. Sabzalieva [22], where it is indicated that despite the initial trend associated with the fall of the previous regime in the former Soviet republics, the tendency to move towards social sciences has persisted, as evidenced by the detailed breakdown of data for Kyrgyz Republic. Universities across the country have noted a decline in the level of maths taught in schools, which may partly explain why students avoid science and engineering subjects in higher education [29]. Students do not consider market requirements when choosing a speciality: in Kyrgyz Republic in 2017, 6542 students received bachelor's degrees in law and only 517 in mining. The latter sector has massive growth potential in the country, while the legal market has long been saturated. Exploring why students continue to choose subjects that are no longer in demand today would be a useful avenue for further research. In a market economy it is necessary to acquire professional competences in a short period of time. As a result, to reduce family expenses, most young people drop out of higher education and switch to short-term vocational programmes [30]. According to available data, while in Soviet times the dropout rate from universities was only 10%, nowadays every third student is expelled [31; 32].

It is also noteworthy that an important problem of the system of higher professional education in Kyrgyz Republic is the tendency to focus on humanitarian specialities when choosing a profession. And Kyrgyz researchers make little mention of this problem. For

instance, according to a study by the Asian Development Bank, about 77% of the total number of students enrolled in higher education in 2019 chose humanities majors. Of these, 32% entered teaching, 26.5% entered economics, 14.4% entered law, 6% entered management, and 21% entered other specialities [23; 33]. As already analysed in Table 1, the number of full-time university students is increasing. Due to the political development of the country, the number of off-campus students is decreasing, and the number of distance learning students is increasing. At the same time, A.Z. Bedelbaeva [11] gives an example that there are no countries that are satisfied with their education system. The author argues that experiments, searches, disputes, and disappointments are nothing but inevitable companions of the process of reforming the education system, which may last for many years. However, before the reforms it is necessary to analyse the existing education system, the established culture of society, in case of borrowing only positive practices that are comparable with cultural and social patterns and then the reform process will be more successful.

Proceeding from the analysed materials and standards of higher education in Kyrgyz Republic, it should be noted that they are adapted to modern requirements, but still a range of reforms aimed at developing national standards of higher professional education have not been finalised. To optimise the structure and content of the higher education system without major additional investments, two main strategies should be considered, which are outlined by J.J. Bruner and A. Tillett [24], namely: strengthening the professionalization of schools; restructuring or eliminating HEIs/branches that do not meet the licensing requirements. Analysing the scientific material of the authors, it is revealed that in higher education in Kyrgyz Republic it is necessary to refine the mechanisms of control and evaluation of higher education institutions to increase the level of public awareness about the directions of professional training in higher education institutions and the results of their activities. It is necessary to revise the list of specialities and areas of training of higher education institutions to ensure their compliance with national and world educational standards and to consider the needs arising from the requirements of the modern market economy [34-36].

The Ministry of Social Protection and Labour, together with other ministries, needs to develop a list of priority areas of specialisation and vocational training, which in general would be in the interests of full-scale socio-economic development of the Kyrgyz Republic. It should be emphasised that insufficient funding does not allow providing the educational process with qualified scientific and pedagogical staff. It is not possible to increase the quality of the faculty from 19.5% to 30-35% while meeting licensing requirements. Therewith, the teaching space in many educational institutions is only 7 m<sup>2</sup> instead of the required 9 m<sup>2</sup> [37]. First of all, instead of understanding the essence and methods of the Bologna Process, the dominant actors in HEIs still maintain and manage formal standards, i.e., imitation. For instance, the two-stage higher vocational education introduced in the country under the "4+2" formula is as follows: young people in Kyrgyz Republic must study for six years to get a higher education [38]. For the Kyrgyz way of thinking, six years of higher

education is an exceedingly long time. Furthermore, considering that 15-20% of master's students are financed from the budget, most graduates have to start their labour activity with a "bachelor's" diploma. Therefore, Kyrgyz Republic may gradually turn into a "country of bachelors". The authors believe that the undergraduate programme should be shortened by three years, which would amount to 180 credits. Comparable experiences are common in countries such as the UK, Norway, and Finland and show favourable outcomes [18; 39]. If, like some European countries, the Kyrgyz Republic adopts the "3+2" model, where young people will obtain a master's degree in five years, one can consider that it has entered the Bologna Process with the status of an equivalent degree.

Due to changes in the economy, production, and labour organisation, the functions of mid-level specialists have also changed, such as administrative and technical support of the management process, direct management of technical, technological, and information systems, quality control and product safety [40]. However, the training of specialists in higher education institutions does not fully meet modern requirements and cannot ensure the performance of such functions. Training in social areas such as pensions, healthcare, various social and psychological support organisations, rehabilitation activities, educational organisations (including organisations for people with disabilities) is sufficient, but the level of its quality requires more effort. Therefore, it is necessary to adjust the requirements for personnel, improve the quality of education and develop mechanisms for the distribution of qualified specialists to needy structures in all regions of the republic.

## Conclusions

Consequently, the selection and application of fundamental methodological approaches, as well as the principles of scientific cognition, made it possible to comprehensively fulfil the research tasks, and helped to build a conceptual research toolkit. Actual methodological diversity helped to carry out a comprehensive study and conduct a comprehensive system analysis of the development of the higher education system of the Kyrgyz Republic. It was found that the development of theoretical and practical aspects of higher education will only occur under favourable conditions that encourage change. It is necessary to train students with the application of a qualitative level of education, considering the regularities of upbringing and development of personality, social relations, trends in the development of professional and spiritual culture of the country, as well as considering the basics of pedagogy and psychology.

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Thus, the practice of independent development of Kyrgyzstan convincingly demonstrates that the state of education largely depends on the effectiveness of socio-economic progress of the country. Today Kyrgyzstan is a regional example of implementing the requirements of the Bologna Convention. The introduction of new educational models has led to the creation of a multi-level system of professional training in the Kyrgyz Republic, which has made it possible to noticeably increase the level of higher education and improve the quality and make Kyrgyz diplomas competitive. The Kyrgyz Republic's participation in the Bologna Process has provided an opportunity to investigate the programmes of study at different levels of higher education, to exchange best practices in research and teaching, and to introduce best practices in university management. The creation of a holistic educational space in the CIS countries and its successful integration into the international education system is becoming one of the priority tasks.

Notably, the republic raises the professional educational level and links it with the production processes of the economy, providing it with modern material and technical equipment and training methods. The system of higher education is closely connected with the customers of graduates – employers in the corporate structure, private enterprises in all sectors of the economy, as enterprises need qualified specialists. The development of higher education institutions requires full support from government, business, and private enterprise, as well as donor support from international foundations and organisations. The higher education system is severely lacking in financial resources and technical support, and therefore higher education institutions need to submit more grants for projects and structural reforms to attract more business structures and interest them with the fact that the training will be in line with their needs.

The socio-economic and cultural preconditions that caused the reform of higher education in Kyrgyz Republic, as well as the sphere of educational co-operation and exchange of practices between higher education institutions in the Middle East and Central Asia may become promising areas for further research.

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## Conflict of Interest

None.

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## **Система вищої освіти в Киргизькій Республіці на сучасному етапі**

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### **Анотація**

**Актуальність.** Актуальність даного дослідження обумовлена тим, що в умовах глобальних змін необхідно готувати нове покоління громадян, здатних адекватно реагувати на виклики суспільства.

**Мета.** Метою цього дослідження було дослідити реформи, проведені у вищій освіті Киргизької Республіки, на предмет відповідності міжнародним стандартам.

**Методологія.** Методологія дослідження ґрунтується на поєднанні загальнонаукових (аналіз, синтез, узагальнення) та спеціально-наукових (історико-логічний, ретроспективний, системно-структурний аналіз, статистичний) методів.

**Результати.** Результати дослідження свідчать про те, що Киргизька Республіка поступово впроваджує європейську ініціативу щодо гармонізації системи освіти для взаємодії між європейськими університетами, а також реформує систему вищої освіти. Зазначено, що в Киргизькій Республіці для реалізації завдань щодо відповідності міжнародним стандартам освіти здійснено перехід на кредитно-модульну систему відповідно до Болонської конвенції; розвивається соціальне партнерство та активне залучення роботодавців до освітнього процесу; проводиться ефективна політика щодо управління людськими ресурсами. За останні 15 років система освіти Киргизької Республіки пройшла два етапи, а саме: ліберальний етап та етап порівняльної стабільності. У Киргизькій Республіці зараз притаманне прагнення до раціоналізації управління освітою, визначальним фактором стала орієнтація на консолідацію та використання європейських практик. В останні роки значно збільшилася кількість програм обміну за участю студентів і викладачів з Киргизької Республіки, наприклад: президентська програма "Ель Умуту", приватні програми від міжнародних організацій (Erasmus Mundus, Tempus).

**Висновки.** Практичне значення дослідження полягає в тому, що основні положення, ідеї та висновки можуть слугувати науковцям, викладачам та дослідникам для подальших наукових пошуків щодо реформування вищої освіти в Киргизькій Республіці.

**Ключові слова:** європейські практики; Болонський процес; університети; програми обміну; міжнародне співробітництво.